

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions, and listings of claims in the application:

Claims 1-8 (Canceled)

9. (Currently Amended) A process for eluting and recovering a metal from a metal collecting material, comprising ~~the steps of~~:

(1) contacting the metal collecting material having absorbed a metal with a dilute eluent,

(2) contacting the metal collecting material with an eluent more concentrated than in step 1 to recover the metal in the eluent; and

(3) contacting a metal resorbing material with the eluate from step 2 to resorb the metal;

wherein the metal collecting material to be treated is prepared by using radiation-induced graft polymerization.

10. (Currently Amended) The process of Claim 9, further comprising [[,]]:
between steps 1 and 2, ~~the step of~~ contacting the collecting material with an eluent having a concentration higher than that of the eluent in step 1 but lower than that of the eluent in step 2.

11. (Currently Amended) The process of Claim 10, further comprising:
two or more elution steps between steps 1 and 2;

wherein the eluent in later steps is adjusted at a concentration higher than in early steps in said further elution steps.

12. (Currently Amended) The process of Claim 9, further comprising:

~~the step of~~ washing the collecting material before step 1 with the effluent from step 1 and/or the effluent from step 3 (~~effluent which is~~ from resorption of the target metal to a metal resorbing material[()]).

13. (Currently Amended) The process of Claim 9, wherein the effluent from step 3 (~~effluent which is~~ from resorption of the target metal to a metal resorbing material[()]) is used as an eluent in step 1.

14. (Currently Amended) The process of Claim 9, further comprising:

~~the step (4) of~~ contacting the metal resorbing material having resorbed the target metal from step 3 with an eluent more concentrated than the eluent used in step 3 to recover the target metal in the eluent.

15. (Currently Amended) The process of Claim 9, wherein the metal collecting material to be treated contains an amidoxime group and/or imidodioxime group.

16. (Currently Amended) The process of Claim 9, wherein the metal collecting material to be treated is in the form of a woven or nonwoven fabric consisting of a fiber assembly.

17. (Canceled)

18. (New) The process according to Claim 9, wherein said metal is uranium or vanadium.

19. (New) The process according to Claim 9, wherein said metal collecting material is a chelate resin based on an amidoxime group.

20. (New) The process according to Claim 9, wherein said dilute eluent in step 1 is 0.01-0.1 N hydrochloric acid.

21. (New) The process according to Claim 9, wherein said eluent in step 2 is 0.2-1 N hydrochloric acid.

22. (New) The process according to Claim 9, wherein calcium and magnesium are eluted in step 1 but not uranium and vanadium.

23. (New) The process according to Claim 9, wherein 90% or more of uranium adsorbed to the collecting material is eluted in step 2.

24. (New) The process according to Claim 9, wherein said metal is a noxious heavy metal.

25. (New) The process according to Claim 9, wherein said metal is nickel or copper.

26. (New) The process according to Claim 9, wherein said collecting material has an iminodiacetate functional group.

27. (New) The process according to Claim 9, wherein said eluent of step 1 is used at a concentration that allows a non-target metal to be eluted but not a target metal.

28. (New) The process according to Claim 9, wherein said eluent of step 2 is used at a concentration that allows target metals to be eluted.

29. (New) The process according to Claim 9, wherein said metal-resorbing material is a member selected from the group consisting of metal-resorbing materials having a chelating group having a high stability constant for complexation with uranium in acidic solutions.

30. (New) The process according to Claim 9, wherein said collecting material has a thiol group.

31. (New) The process according to Claim 9, wherein said metal is uranium.

BASIS FOR THE AMENDMENT

Claims 1-8 and 17 have been canceled.

The limitations of Claim 17 have been included in Claim 9.

New Claims 18-31 have been added as supported, for example, at pages 16-24 of the specification.

No new matter is believed to have been added by entry of this amendment. Entry and favorable reconsideration are respectfully requested.

Upon entry of this amendment Claims 9-16 and 18-31 will now be active in this application.